Xitanium[™] LED Drivers





Optimal operation of Luxeon[™] high power LEDs for indoor and outdoor applications

• Enjoy more design freedom

• Increase safety and reliability



Wetherspoon pub Durham, UK. Sign by Pearce Signs.



With an output of 60W of red Luxeons the chimneys of Technopolis, Athens, Greece, are visible from 1 kilometer. Lighting by Philips Luminaires.





Original thinking

In the past 10 years dramatic progress has been made in LED technology – especially the colour range, luminous efficacy, and light output. This has created new opportunities for lighting designers in all kinds of applications ranging from retail to orientation and emergency lighting to signage. At the forefront of this progress is Philips Lighting. In 1999 our joint venture with Agilent Technologies, Lumileds, launched the world's first commercially available high output LED: the Luxeon range. This has been continually improved and is now at the heart of Philips LED Module and Component Systems. In parallel, Philips has developed the Xitanium range of LED Drivers - optimized for use with the Luxeon LEDs. Take a look at how you can benefit:

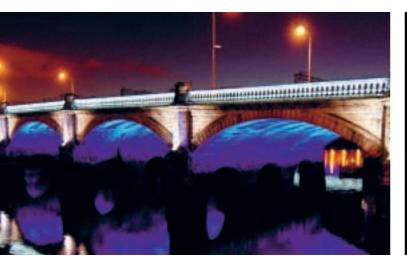
What is a Xitanium[™] LED Driver?



Xitanium LED Drivers from Philips are designed specifically to power Luxeon high power LEDs. Philips has used its extensive expertise in electronics to ensure that Driver and LED are perfectly 'fine-tuned' to each other, and that the exceptionally steady DC output enhances the long life and optimum operation the high power LEDs.

Sohar, Dubai, Lighting by Philips Luminaires.

The bridge over the river Clyde in Glasgow, Scotland. Lighting by Philips Luminaires.





New design opportunities

The Xitanium's small, compact size enables you to innovate with new, low-profile fixture designs.

Hazard-free

All the major safety requirements (as defined in CE, ENEC, KEMA, and UL) are met, so you can install them in practically any location.

Excellent reliability

Xitanium LED Drivers last up to 50,000 hours, to take advantage of the long life of LEDs. They come with the Philips electronic ballast guarantee.

Wide choice

Extensive product portfolio gives you a wide choice. Portfolio consist of in- and outdoor types with power ratings from 12 to 80W, including a 25W for dimming possibilities.

Improved safety

Xitanium LED Drivers generate a limited output voltage and current and also provide isolation for safe operation.

Low-temperature performance (-40°C)

So you can be confident in any outdoor application.

Universality

Although optimized for high power Luxeon LEDs, the Xitanium range of Drivers is also suitable for other LED based systems.

Typical applications include:

- Channel letter/contour lighting
- Architectural lighting
- Retail/theme lighting
- Orientation lighting (path lighting)
- Entertainment lighting
- Emergency and security





Xitanium Drivers perfectly operate the Philips LED-based systems including: The LED Module System: lighting blocks which can be joined in flexible 'domino-like' arrays to produce creative luminaires and displays.

 LED String: a wire connected string of LEDs for safer, more energy efficient signs and architectural effects.



Also Xitanium Drivers are optimized for use with all Luxeon LEDs

 Luxeon LEDs from the Lumileds Lighting company are state-ofthe-art solid-state lighting devices - the brightest LEDs on the market in a very compact package. Ideal for high-lumen, general lighting.

System overview

Quick selection table

Description	Configuration options	Description	Configuration options		
12W 350mA	- 1-8 one-watt Luxeons - max. 3.2m Philips LED String Red & Amber - max. 3.5m Philips LED String Blue & Green	25W 1050mA (indoor only)	- 3, 6, 9, 12, 15 or 18 one-watt Luxeons - 18-up Luxeon array - 1-5 three-watt at 1.0A Luxeons		
17W 700mA	 - 6, 8, 10 or 12 one-watt Luxeons - 6-up and 12-up Luxeon lines, rings or arrays - 1-5 three-watt Luxeons - 1-3 five-watt Luxeons 	25W 1050mA Dimming (indoor only)	- 15 or 18 one-watt Luxeons		
	- max. 5.0m Philips LED String Red & Amber - max. 4.2m Philips LED String Blue & Green - 1-10 Philips LED Modules	40W 1750mA	- 5, 10, 15, 20, 25 or 30 one-watt Luxeons - Philips LED String White max. 4.0m - 1-24 Philips LED Modules		
		67W 2800mA (outdoor only)	- 8, 16, 24, 32, 40 or 48 one-watt Luxeons - 4, 8, 12, 16 or 20 three-watt Luxeons		
		80W 3150mA	- 9, 18, 27, 36, 45 or 54 one-watt Luxeons		

Specifications

Description	Input			Output			Tc max.
LED Driver	Voltage V	Max. power W	Max. current A	Max. power W	Current A	Voltage V	
12W indoor	207 - 264	15.0	0.14	12.0	350 +/- 5%	2.6 - 33.0	85
17W indoor	207 - 264	21.5	0.20	17.1	700 +/- 5%	2.6 - 24.6	85
25W indoor	207 - 264	31.9	0.30	25.5	1050 +/- 5%	2.6 - 24.6	85
25W DIM indoor	207 - 264	31.9	0.30	25.5	1050 +/- 5%	14 - 24.0	85
40W indoor	207 - 264	51.0	0.47	40.8	1750 +/- 5%	2.6 - 24.0	85
12W outdoor	207 - 264	15.0	0.14	12.0	350 +/- 5%	2.6 - 33.0	90
17W outdoor	207 - 264	21.5	0.20	17.1	700 +/- 5%	2.6 - 24.6	90
40W outdoor	207 - 264	51.0	0.47	40.8	1750 +/- 5%	2.6 - 24.0	50
67W outdoor	207 - 264	80.0	0.40	67.2	2800 +/- 5%	2.6 - 25.0	90
80W outdoor	207 - 264	95.0	0.50	80.0	3300 +/- 5%	2.6 - 25.0	90

(outdoor only)

Ordering Information

Description LED Driver	Box	EOC	Description LED Driver	Box	EOC
	packaging			packaging	
12W indoor	10	749963 30	12W outdoor	10	930453 30
17W indoor	10	749987 30	17W outdoor	10	930958 30
25W indoor	12	927361 30	40W outdoor	3	931221 30
25W DIM indoor	12	927408 30	67W outdoor	20	931207 30
40W indoor	12	927385 30	80W oudoor	20	931245 30

Note: for more detailed information on LED Drivers, LED Modules and LED String ask for specific product data sheets.



Xitanium^M is a registered trademark of Philips Electronics NV. Luxeon^M is a registered trademark of Lumileds.

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- 5, 10, 15 or 25 three-watt Luxeons